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Memorandum

M8141-SLF-05-060

To: S. J. Trent A0-21 Date: January 24, 2005

From: S. L. Fitzgerald, Manager *MAN* / *MICHAEL S. NEELY*
 WSCF Analytical Chemistry *FOR* / *Michael S. Neely*

cc:	w/Attachments	w/o Attachments
	T. F. Dale S3-28	D. J. Hart S3-30
	H. K. Meznarich S3-30	M. A. Neely S3-30
	P. D. Mix S3-30	H. S. Rich S3-28
	J. E. Trechter S3-30	L. C. Swanson E6-35
		File/LB

Subject: FINAL RESULTS FOR 200-MW-1 CHARACTERIZATION SAMPLING AND ANALYSIS -
 SOIL- SAMPLE DELIVERY GROUP WSCF20042473 – SAF NUMBER F04-015

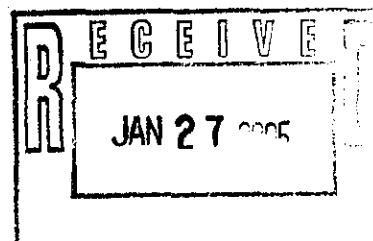
Reference: (1) Groundwater Protection Program-Letter of Instruction, FH-EIS-2003-MEM-001,
 October 31, 2002
 (2) HNF-SD-CD-QAPP-017, Rev. 6, Waste Sampling & Characterization Facility Quality
 Assurance Plan

This letter contains a narrative (Attachment 1) for sample delivery group WSCF20042473, the analytical results (Attachment 2), and the sample receipt information (Attachment 3).

SLF/grf

Attachments 3

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MAY 18 2005
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M8141-SLF-05-060

ATTACHMENT 1

NARRATIVE

Consisting of 6 pages
Including cover page

Sample Delivery Group	WSCF20042473
Sample Matrix	Soil
Sample Visual	N/A
SAF Number	F04-015
Data Deliverable	Summary Report

Introduction

One (1) 200-MW-1 Characterization Sampling and Analysis – Soil/216-U-3, 127' – 129.5', sample (B19945) was received at the WSCF Laboratory on December 20, 2004. The sample was analyzed for the analytes indicated on the attached copy of the chain of custody (COC) form in accordance with the *Groundwater Remediation Program- Letter of Instruction*, referenced in the cover letter.

The narrative (Attachment 1) will address sample characteristics, analyses requested and general information in performance of the analytical methods. A Data Summary Report (Attachment 2) includes analytical results, a comment report detailing method abnormalities, tentatively identified peaks if applicable, method references, and Laboratory QC information. Copies of the Chain of Custody and Request for Sample Analysis forms are included as Attachment 3.

Analytical Methodology for Requested Analyses

Inorganic

- Anions by EPA Method 300. Analytical work was performed with no deviations to the approved method.
- Cyanide by EPA Method 600/R-94-111 300. Analytical work was performed with no deviations to the approved method.
- ICP-MS Metals by EPA Method 200.8. Analytical work was performed with no deviations to the approved method.
- Percent Solids by EPA Method 160.3. Analytical work was performed with no deviations to the approved method.
- pH by EPA Method 9045C. Analytical work was performed with no deviations to the approved method.

Organic

- PCB by EPA Method 8082. Analytical work was performed with no deviations to the approved method.

- Semi-VOA by EPA Method 8270C. Analytical work was performed with no deviations to the approved method.
- TPH Diesel/Gas Range by WDOE Method NWTPH-Dx/Gx. Analytical work was performed with no deviations to the approved method.
- VOA by EPA Method 8260B. Analytical work was performed with no deviations to the approved method.

Radiochemistry

- All RadChem analyses (AEA (Plutonium, Americium and Uranium), GEA, Sr-89/90) were run by internal WDOE accredited WSCF procedures. Analytical work was performed with no deviations to the approved method.

Inorganic Comments

Anions - The hold times for Nitrite and Nitrate analyses were not met. A Blank, Laboratory Control Sample, Duplicate, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per GPP Letter of Instruction. See pages 11 through 12 for QC details.
Analytical Notes:

- Preparation Date: 06-jan-2005.
- Nitrate and Sulfate - Sample B19945 results were B-flagged; the analyte was less than the reportable detection limit, but greater than or equal to the method detection limit.

All QC controls are within the established limits.

Cyanide- The hold time for this analysis was met. A Blank, Preparation Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per GPP Letter of Instruction. See page 13 for QC details. Analytical Note:

- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B19943 (SDG# 20042435, SAF# F04-015).

All QC controls are within the established limits.

ICP-MS Metals – The hold time for this analysis was met. A Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GPP Letter of Instruction. See pages 14 through 16 for QC details. Analytical Notes:

- Preparation Date: 13-jan-2005.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B19944 (SDG# 20042459, SAF# F04-015).

- Matrix Spike and Matrix Spike Duplicate QC precision were evaluated on samples# B1B581 (SDG# 20042466, SAF# F03-006) and B1C369 (SDG# 20050062, SAF# F05-002).
- Copper, Mercury and Silver - The analytes detected in the associated preparation Blank sample were evaluated and there was no significant affect on the sample results.

All other QC controls are within the established limits.

Percent Solids – Analyzed for organic results correction.

pH – The hold time for this analysis was met. All internal laboratory controls were within established limits.

Organic Comments

- Sample results were moisture corrected and reported on a dry-weight basis.

PCB – The hold time for this analysis was met. A Blank, Duplicate, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GPP Letter of Instruction. See pages 20 through 21 for QC details. Analytical Notes:

- Preparation Date: 21-dec-2004.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B19943 (SDG# 20042435, SAF# F04-015).

All QC controls are within the established limits.

Semi-VOA – The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GPP Letter of Instruction. See pages 22 through 25 for QC details. Analytical Notes:

- Preparation Date: 21-dec-2004.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B1B580 (SDG# 20042436, SAF# F03-006).

All QC controls are within the established limits.

TPHD-WA - The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spike Duplicate were analyzed with each delivery group per GPP Letter of Instruction. See page 26 for QC details. Analytical Notes:

- Preparation Date: 21-dec-2004.
- Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B19943 (SDG# 20042435, SAF# F04-015).

All QC controls are within the established limits.

TPHG-WA - The hold time for this analysis was met. A Blank, Duplicate, Laboratory Control Sample, Matrix Spike and Matrix Spike Duplicate were analyzed with each delivery group per GPP Letter of Instruction. See page 27 for QC details. Analytical Notes:

- Preparation Date: 03-jan-2005.
- Duplicate, Matrix Spike and Matrix Spike Duplicate QC samples were analyzed on sample# B19945 (SDG# 20042473, SAF# F04-015).

All QC controls are within the established limits.

VOA – The hold time for this analysis was met. A Blank, Laboratory Control Sample, Matrix Spike and Matrix Spiked Duplicate were analyzed with each delivery group per the GPP Letter of Instruction. See pages 28 through 30 for QC details. All QC controls are within the established limits.

Radiochemistry Comments

RadChem – There are no hold times associated with these WDOE accredited methods. A Blank, Laboratory Control Sample and Duplicate were analyzed with each delivery group per the GPP Letter of Instruction. See pages 32 through 36 for QC details. All QC controls are within the established limits.

Radiochemical Tracer Percent Recovery

Sample Number	Lab Sample ID	Isotope	Tracer Recovery (Percent)
BLANK		Sr-85	76.1
LCS		Sr-85	103.0
B19945	W040002744	Sr-85	86.5
DUPLICATE	W040002744	Sr-85	91.1
BLANK		Am-243	55.4
LCS		Am-243	87.2
B19945	W040002744	Am-243	78.3
DUPLICATE	W040002744	Am-243	72.1

Radiochemical Tracer Percent Recovery			
Sample Number	Lab Sample ID	Isotope	Tracer Recovery (Percent)
BLANK		Pu-242	87.5
LCS		Pu-242	93.6
B19945	W040002744	Pu-242	80.9
DUPLICATE	W040002744	Pu-242	80.0
BLANK		U-232	81.8
LCS		U-232	39.8
B19945	W040002744	U-232	70.53
DUPLICATE	W040002744	U-232	73.5

This Summary Report is in compliance with the SOW, both technically and for completeness. Release of the data contained in this hard copy report has been authorized by the WSCF Laboratory Analytical Manager and Client Services, as verified by the following signature.

Herlene S. Rich
WSCF Production Control

Abbreviations

Hg – mercury	Am – americium
IC – ion chromatography	Cm - curium
ICP – inductively coupled plasma	Pu – plutonium
ICP/AES – ICP/atomic emission spectroscopy	Np – neptunium
ICP/MS – ICP/mass spectrometry	GEA – gamma energy analysis
Total U – total uranium	H3 – Tritium
AT/TB – total alpha/total beta	Sr – Strontium 89, 90
AEA – Alpha Energy Analysis	WTPH-D – Total Hydrocarbons-Diesel
WTPH-G – Total Hydrocarbons-Gasoline	TSS – Total Suspended Solids

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ATTACHMENT 2

ANALYTICAL RESULTS

Consisting of 36 pages
Including cover page

WSCF
ANALYTICAL RESULTS REPORT

for

Groundwater Remediation Program

Richland, WA 99354

Attention: Steve Trent

Analytical: S. F. Ferguson (d)

Client Services: C. D. Mix
P.D. mix

All results are reported on an "as received" basis unless otherwise noted in the comment section.

Confidentiality Notice: The information contained in this report is privileged and confidential information intended only for the use of the addressee. If the reader of this report is not the intended recipient, or the employee or agent responsible to deliver it to the intended recipient, you are hereby notified that any dissemination, distribution or copying of this communication is strictly prohibited. If you have received this communication in error, please notify us immediately by telephone at (509) 373-7020.

Contract#: FH-EIS-2003-MEM-001

Report#: WSCF20042473

Report Date: 21-jan-2005

Report WGPP/ver. 1.1

Groundwater Remediation Program

Page 1

WSCF

ANALYTICAL RESULTS REPORT

Attention:
Project:

Steve Trent
F04-015: F04-015

Group #: WSCF20042473

Sample #	Client ID	CAS #	Test Performed	Matrix	WSCF		Result	Unit	DF	MDL	Analyze Sample	Receive
					Method	RQ						
Inorganic												
W040002744	B19945	TRENT	57-12-5	Cyanide	SOIL	LA-695-402	U	< 0.200	mg/kg	1.00	0.20	12/29/04 12/20/04 12/20/04
W040002744	B19945	TRENT	TS	Total solids	SOIL	LA-519-412		90.9	%	1.00	0.0	12/22/04 12/20/04 12/20/04
W040002744	B19945	TRENT	PH	pH Measurement	SOIL	LA-212-411		8.51	pH	1.00	0.010	12/20/04 12/20/04 12/20/04
W040002744	B19945	TRENT	16984-48-8	Fluoride	SOIL	LA-533-410	U	< 1.15	mg/kg	50.00	1.2	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	N02-N	Nitrogen in Nitrite	SOIL	LA-533-410	U	< 0.950	mg/kg	50.00	0.95	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	NO3-N	Nitrogen in Nitrate	SOIL	LA-533-410	B	1.93	mg/kg	50.00	0.65	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	PO4-P	Phosphate (P) by IC	SOIL	LA-533-410	U	< 2.70	mg/kg	50.00	2.7	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	14808-79-8	Sulfate	SOIL	LA-533-410	B	9.96	mg/kg	50.00	5.0	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7440-22-4	Silver	SOIL	LA-505-412		2.64	mg/kg	9.98	2.0	01/14/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7440-43-9	Cadmium	SOIL	LA-505-412	U	< 0.998	mg/kg	9.98	1.0	01/14/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7440-47-3	Chromium	SOIL	LA-505-412		15.1	mg/kg	9.98	3.0	01/14/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7440-50-8	Copper	SOIL	LA-505-412		21.9	mg/kg	9.98	5.0	01/14/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7439-92-1	Lead	SOIL	LA-505-412	U	< 12.0	mg/kg	9.98	12	01/14/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7439-97-6	Mercury	SOIL	LA-505-412	U	< 0.998	mg/kg	9.98	1.0	01/14/05 12/20/04 12/20/04
W040002744	B19945	TRENT	7440-61-1	Uranium	SOIL	LA-505-412		1.25	mg/kg	9.98	1.0	01/14/05 12/20/04 12/20/04

MDL=Minimum Detection Limit

B - The analyte < the RDL but > = the IDL/MDL (inorganic)

U - Analyzed for but not detected above limiting criteria.

RQ=Result Qualifier

DF=Dilution Factor

* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

Report WGPP/ver. 1.1

Groundwater Remediation Program

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WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: Anions by Ion Chromatography

SAF Number: F04-015

Sample Date: 12/20/04

Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

DUP	Fluoride	16984-48-8	<1.15e0	n/a	RPD	01/05/05	0.000	20.000	U
DUP	Nitrogen in Nitrite	NO2-N	<9.50e-1	n/a	RPD	01/05/05	0.000	20.000	U
DUP	Nitrogen in Nitrate	NO3-N	2.16e+00	11.247	RPD	01/05/05	0.000	20.000	
DUP	Phosphate (P) by IC	PO4-P	<2.70e0	n/a	RPD	01/05/05	0.000	20.000	U
DUP	Sulfate	14808-79-8	<5.00e0	n/a	RPD	01/05/05	0.000	20.000	U
MS	Fluoride	16984-48-8	4.34e-01	87.854	% Recov	01/05/05	75.000	125.000	
MS	Nitrogen in Nitrite	NO2-N	4.83e-01	96.600	% Recov	01/05/05	75.000	125.000	
MS	Nitrogen in Nitrate	NO3-N	4.36e-01	96.674	% Recov	01/05/05	75.000	125.000	
MS	Phosphate (P) by IC	PO4-P	7.97e-01	82.250	% Recov	01/05/05	75.000	125.000	
MS	Sulfate	14808-79-8	1.85e+00	92.500	% Recov	01/05/05	75.000	125.000	
MSD	Fluoride	16984-48-8	4.56e-01	92.308	% Recov	01/05/05	75.000	125.000	
MSD	Nitrogen in Nitrite	NO2-N	4.70e-01	94.000	% Recov	01/05/05	75.000	125.000	
MSD	Nitrogen in Nitrate	NO3-N	4.56e-01	101.109	% Recov	01/05/05	75.000	125.000	
MSD	Phosphate (P) by IC	PO4-P	8.25e-01	85.139	% Recov	01/05/05	75.000	125.000	
MSD	Sulfate	14808-79-8	1.81e+00	90.500	% Recov	01/05/05	75.000	125.000	

BATCH QC

BLANK	Fluoride	16984-48-8	<2.30e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Fluoride	16984-48-8	<2.30e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Fluoride	16984-48-8	<2.30e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Nitrogen in Nitrite	NO2-N	<1.90e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Nitrogen in Nitrite	NO2-N	<1.90e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Nitrogen in Nitrite	NO2-N	<1.90e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Nitrogen in Nitrate	NO3-N	<1.30e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Nitrogen in Nitrate	NO3-N	<1.30e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Nitrogen in Nitrate	NO3-N	<1.30e-2	n/a	mg/L	01/05/05	0.000	300.000	U

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: Anions by Ion Chromatography

SAF Number: F04-015

Sample Date:

Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Phosphate (P) by IC	PO4-P	<5.40e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Phosphate (P) by IC	PO4-P	<5.40e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Phosphate (P) by IC	PO4-P	<5.40e-2	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Sulfate	14808-79-8	<1.00e-1	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Sulfate	14808-79-8	<1.00e-1	n/a	mg/L	01/05/05	0.000	300.000	U
BLANK	Sulfate	14808-79-8	<1.00e-1	n/a	mg/L	01/05/05	0.000	300.000	U
LCS	Fluoride	16984-48-8	9.79e+01	99.189	% Recov	01/05/05	80.000	120.000	
LCS	Fluoride	16984-48-8	9.02e+01	91.388	% Recov	01/05/05	80.000	120.000	
LCS	Nitrogen in Nitrite	NO2-N	1.02e+02	102.000	% Recov	01/05/05	80.000	120.000	
LCS	Nitrogen in Nitrite	NO2-N	9.86e+01	98.600	% Recov	01/05/05	80.000	120.000	
LCS	Nitrogen in Nitrate	NO3-N	9.51e+01	105.549	% Recov	01/05/05	80.000	120.000	
LCS	Nitrogen in Nitrate	NO3-N	9.12e+01	101.221	% Recov	01/05/05	80.000	120.000	
LCS	Phosphate (P) by IC	PO4-P	1.90e+02	98.039	% Recov	01/05/05	80.000	120.000	
LCS	Phosphate (P) by IC	PO4-P	1.94e+02	100.103	% Recov	01/05/05	80.000	120.000	
LCS	Sulfate	14808-79-8	3.85e+02	96.491	% Recov	01/05/05	80.000	120.000	
LCS	Sulfate	14808-79-8	3.89e+02	97.494	% Recov	01/05/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: Cyanide by Midi/Spectrophotom

SAF Number: F04-015

Sample Date: 12/15/04

Receive Date: 12/15/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002627

BATCH QC ASSOCIATED WITH SAMPLE

MS	Cyanide by Midi/Spectrophotom	57-12-5	97.7	97.700	% Recov	12/29/04	75.000	125.000	
MSD	Cyanide by Midi/Spectrophotom	57-12-5	95.2	95.200	% Recov	12/29/04	75.000	125.000	
SPK-RPD	Cyanide by Midi/Spectrophotom	57-12-5	95.200	2.592	RPD	12/29/04	0.000	20.000	

BATCH QC

BLANK	Cyanide by Midi/Spectrophotom	57-12-5	1	1.000	ug/L	12/29/04	-4.000	4.000	
BLNK-PREP	Cyanide by Midi/Spectrophotom	57-12-5	1	1.000	ug/L	12/29/04	-4.000	4.000	
LCS	Cyanide by Midi/Spectrophotom	57-12-5	103.1	103.100	% Recov	12/29/04	85.000	115.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: ICP-2008 MS All possible metal

SAF Number: F04-015

Sample Date: 12/16/04

Receive Date: 12/16/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002732

BATCH QC ASSOCIATED WITH SAMPLE

MS	Silver	7440-22-4	381.1	95.275	% Recov	01/14/05	70.000	130.000	
MS	Cadmium	7440-43-9	396.5	99.125	% Recov	01/14/05	70.000	130.000	
MS	Chromium	7440-47-3	387.65	96.912	% Recov	01/14/05	70.000	130.000	
MS	Copper	7440-50-8	371.97	92.993	% Recov	01/14/05	70.000	130.000	
MS	Mercury	7439-97-6	19.28	96.400	% Recov	01/14/05	70.000	130.000	
MS	Lead	7439-92-1	388.3	97.075	% Recov	01/14/05	70.000	130.000	
MS	Uranium	7440-61-1	397.5	99.375	% Recov	01/14/05	70.000	130.000	
MSD	Silver	7440-22-4	379.5	94.875	% Recov	01/14/05	70.000	130.000	
MSD	Cadmium	7440-43-9	385.7	96.425	% Recov	01/14/05	70.000	130.000	
MSD	Chromium	7440-47-3	369.75	92.438	% Recov	01/14/05	70.000	130.000	
MSD	Copper	7440-50-8	372.17	93.043	% Recov	01/14/05	70.000	130.000	
MSD	Mercury	7439-97-6	19.09	95.450	% Recov	01/14/05	70.000	130.000	
MSD	Lead	7439-92-1	375.9	93.975	% Recov	01/14/05	70.000	130.000	
MSD	Uranium	7440-61-1	382.1	95.525	% Recov	01/14/05	70.000	130.000	

Lab ID: W040002742

BATCH QC ASSOCIATED WITH SAMPLE

MS	Silver	7440-22-4	395	98.750	% Recov	01/14/05	70.000	130.000	
MS	Cadmium	7440-43-9	407.2	101.800	% Recov	01/14/05	70.000	130.000	
MS	Chromium	7440-47-3	382.52	95.630	% Recov	01/14/05	70.000	130.000	
MS	Copper	7440-50-8	378.94	94.735	% Recov	01/14/05	70.000	130.000	
MS	Mercury	7439-97-6	20.27	101.350	% Recov	01/14/05	70.000	130.000	
MS	Lead	7439-92-1	397.7	99.425	% Recov	01/14/05	70.000	130.000	
MS	Uranium	7440-61-1	401.4	100.350	% Recov	01/14/05	70.000	130.000	
MSD	Silver	7440-22-4	390.3	97.575	% Recov	01/14/05	70.000	130.000	
MSD	Cadmium	7440-43-9	412.4	103.100	% Recov	01/14/05	70.000	130.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: ICP-2008 MS All possible metal

SAF Number: F04-015

Sample Date: 12/16/04

Receive Date: 12/16/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
MSD	Chromium	7440-47-3	379.12	94.780	% Recov	01/14/05	70.000	130.000	
MSD	Copper	7440-50-8	390.44	97.610	% Recov	01/14/05	70.000	130.000	
MSD	Mercury	7439-97-6	20.4	102.000	% Recov	01/14/05	70.000	130.000	
MSD	Lead	7439-92-1	395	98.750	% Recov	01/14/05	70.000	130.000	
MSD	Uranium	7440-61-1	405.1	101.275	% Recov	01/14/05	70.000	130.000	
SPK-RPD	Silver	7440-22-4	97.575	1.197	RPD	01/14/05	0.000	20.000	
SPK-RPD	Cadmium	7440-43-9	103.100	1.269	RPD	01/14/05	0.000	20.000	
SPK-RPD	Mercury	7439-97-6	102.000	0.639	RPD	01/14/05	0.000	20.000	
SPK-RPD	Lead	7439-92-1	98.750	0.681	RPD	01/14/05	0.000	20.000	

Lab ID: W050000037

BATCH QC ASSOCIATED WITH SAMPLE

MS	Chromium	7440-47-3	NA	n/a	% Recov	01/14/05	70.000	130.000	
MS	Uranium	7440-61-1	367.92	91.980	% Recov	01/14/05	70.000	130.000	
MSD	Chromium	7440-47-3	NA	n/a	% Recov	01/14/05	70.000	130.000	
MSD	Uranium	7440-61-1	394.22	98.555	% Recov	01/14/05	70.000	130.000	

Lab ID: W050000048

BATCH QC ASSOCIATED WITH SAMPLE

MS	Chromium	7440-47-3	368.44	92.110	% Recov	01/14/05	70.000	130.000	
MS	Copper	7440-50-8	375.38	93.845	% Recov	01/14/05	70.000	130.000	
MS	Uranium	7440-61-1	385.5	96.375	% Recov	01/14/05	70.000	130.000	
MSD	Chromium	7440-47-3	382.44	95.610	% Recov	01/14/05	70.000	130.000	
MSD	Copper	7440-50-8	390.48	97.620	% Recov	01/14/05	70.000	130.000	
MSD	Uranium	7440-61-1	401.9	100.475	% Recov	01/14/05	70.000	130.000	
SPK-RPD	Chromium	7440-47-3	95.610	3.729	RPD	01/14/05	0.000	20.000	
SPK-RPD	Copper	7440-50-8	97.620	3.943	RPD	01/14/05	0.000	20.000	
SPK-RPD	Uranium	7440-61-1	100.475	4.166	RPD	01/14/05	0.000	20.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: ICP-2008 MS All possible metal

SAF Number: F04-015

Sample Date:

Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BATCH QC									
BLANK	Silver	7440-22-4	<0.2	n/a	ug/L	01/14/05			U
BLANK	Silver	7440-22-4	0.27	0.270	ug/L	01/14/05			
BLANK	Cadmium	7440-43-9	<0.1	n/a	ug/L	01/14/05			U
BLANK	Cadmium	7440-43-9	<0.1	n/a	ug/L	01/14/05			U
BLANK	Chromium	7440-47-3	<0.3	n/a	ug/L	01/14/05			U
BLANK	Chromium	7440-47-3	<0.3	n/a	ug/L	01/14/05			U
BLANK	Copper	7440-50-8	0.93	0.930	ug/L	01/14/05			
BLANK	Copper	7440-50-8	0.78	0.780	ug/L	01/14/05			
BLANK	Mercury	7439-97-6	<0.1	n/a	ug/L	01/14/05			U
BLANK	Mercury	7439-97-6	0.16	0.160	ug/L	01/14/05			
BLANK	Lead	7439-92-1	<1.2	n/a	ug/L	01/14/05			U
BLANK	Lead	7439-92-1	<1.2	n/a	ug/L	01/14/05			U
BLANK	Uranium	7440-61-1	<0.1	n/a	ug/L	01/14/05			U
BLANK	Uranium	7440-61-1	<0.1	n/a	ug/L	01/14/05			U
LCS	Silver	7440-22-4	155.2	122.205	% Recov	01/14/05	110.000	170.000	
LCS	Silver	7440-22-4	155.4	122.362	% Recov	01/14/05	110.000	170.000	
LCS	Cadmium	7440-43-9	143.6	110.462	% Recov	01/14/05	88.000	127.000	
LCS	Cadmium	7440-43-9	146	112.308	% Recov	01/14/05	88.000	127.000	
LCS	Chromium	7440-47-3	78.26	109.302	% Recov	01/14/05	50.000	126.000	
LCS	Chromium	7440-47-3	75.35	105.237	% Recov	01/14/05	50.000	126.000	
LCS	Copper	7440-50-8	158.6	107.162	% Recov	01/14/05	61.000	134.000	
LCS	Copper	7440-50-8	171.6	115.946	% Recov	01/14/05	61.000	134.000	
LCS	Mercury	7439-97-6	16.57	98.047	% Recov	01/14/05	75.000	114.000	
LCS	Mercury	7439-97-6	16.07	95.089	% Recov	01/14/05	75.000	114.000	
LCS	Lead	7439-92-1	153.8	110.647	% Recov	01/14/05	87.000	120.000	
LCS	Lead	7439-92-1	158	113.669	% Recov	01/14/05	87.000	120.000	
LCS	Uranium	7440-61-1	401	100.250	% Recov	01/14/05	89.000	107.000	
LCS	Uranium	7440-61-1	405.6	101.400	% Recov	01/14/05	89.000	107.000	

WSCF

ANALYTICAL RESULTS REPORT

**Attention:
Project:**

Steve Trent
F04-015: F04-015

Group #: WSCF20042473

Sample #	Client ID	CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze Sample	Receive
Organic												
W040002744	B19945	TRENT	TPH/GASOLINE	Total Pet. Hydrocarbons Gas	SOIL	LA-523-443	U	< 250	ug/kg	1.00	2.5e+02	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	12674-11-2	Aroclor-1016	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	11104-28-2	Aroclor-1221	SOIL	LA-523-427	U	< 110	ug/kg	1.00	1.1e+02	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	11141-16-5	Aroclor-1232	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	53469-21-9	Aroclor-1242	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	12672-29-6	Aroclor-1248	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	11097-69-1	Aroclor-1254	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	11096-82-5	Aroclor-1260	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	37324-23-5	Aroclor-1262	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	11100-14-4	Aroclor-1268	SOIL	LA-523-427	U	< 55.0	ug/kg	1.00	55	01/04/05 12/20/04 12/20/04
W040002744	B19945	TRENT	100-02-7	4-Nitrophenol	SOIL	LA-523-456	U	< 710	ug/kg	1.00	7.1e+02	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	106-46-7	1,4-Dichlorobenzene	SOIL	LA-523-456	U	< 340	ug/kg	1.00	3.4e+02	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	108-95-2	Phenol	SOIL	LA-523-456	U	< 110	ug/kg	1.00	1.1e+02	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	120-82-1	1,2,4-Trichlorobenzene	SOIL	LA-523-456	U	< 320	ug/kg	1.00	3.2e+02	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	121-14-2	2,4-Dinitrotoluene	SOIL	LA-523-456	U	< 73.0	ug/kg	1.00	73	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	129-00-0	Pyrene	SOIL	LA-523-456	U	< 73.0	ug/kg	1.00	73	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	59-50-7	4-Chloro-3-methylphenol	SOIL	LA-523-456	U	< 73.0	ug/kg	1.00	73	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	621-64-7	N-Nitrosodi-n-dipropylamine	SOIL	LA-523-456	U	< 73.0	ug/kg	1.00	73	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	83-32-9	Acenaphthene	SOIL	LA-523-456	U	< 73.0	ug/kg	1.00	73	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	87-86-5	Pentachlorophenol	SOIL	LA-523-456	U	< 330	ug/kg	1.00	3.3e+02	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	95-57-8	2-Chlorophenol	SOIL	LA-523-456	U	< 160	ug/kg	1.00	1.6e+02	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	126-73-8	Tributyl phosphate	SOIL	LA-523-456	U	< 73.0	ug/kg	1.00	73	01/05/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-35-4	1,1-Dichloroethene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	79-01-6	Trichloroethene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	71-43-2	Benzene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	108-88-3	Toluene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04

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U - Analyzed for but not detected above limiting criteria.

RQ=Result Qualifier

DF=Dilution Factor

* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

Report WGPP/ver. 1.1

Groundwater Remediation Program

WSCF

ANALYTICAL RESULTS REPORT

Attention: Steve Trent **Group #:** WSCF20042473
Project: F04-015: F04-015

Sample #	Client ID	CAS #	Test Performed	Matrix	WSCF		Unit	DF	MDL	Analyze Sample	Receive	
					Method	RQ						
W040002744	B19945	TRENT	108-90-7	Chlorobenzene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-34-3	1,1-Dichloroethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	100-41-4	Ethylbenzene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	100-42-5	Styrene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	10061-01-5	cis-1,3-Dichloropropene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	10061-02-6	trans-1,3-Dichloropropene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	107-06-2	1,2-Dichloroethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	108-10-1	4-Methyl-2-Pentanone	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	124-48-1	Dibromochloromethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	127-18-4	Tetrachloroethene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	1330-20-7	Xylenes (total)	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	540-59-0	1,2-Dichloroethene(Total)	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	56-23-5	Carbon tetrachloride	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	591-78-6	2-Hexanone	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	67-64-1	Acetone	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	67-66-3	Chloroform	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	71-55-6	1,1,1-Trichloroethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	74-83-9	Bromomethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	74-87-3	Chloromethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-00-3	Chloroethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-01-4	Vinyl chloride	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-09-2	Methylenechloride	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-15-0	Carbon disulfide	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-25-2	Bromoform	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	75-27-4	Bromodichloromethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	78-87-5	1,2-Dichloropropane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	78-93-3	2-Butanone	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04 12/20/04

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Report WGPP/ver. 1.1

Groundwater Remediation Program

WSCF

ANALYTICAL RESULTS REPORT

Attention: Steve Trent **Group #:** WSCF20042473
Project: F04-015: F04-015

Sample #	Client ID	CAS #	Test Performed	Matrix	WSCF		Result	Unit	DF	MDL	Analyze Sample	Receive	
					Method	RQ							
W040002744	B19945	TRENT	79-00-5	1,1,2-Trichloroethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	79-34-5	1,1,2,2-Tetrachloroethane	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	71-36-3	1-Butanol	SOIL	LA-523-455	U	< 44.0	ug/kg	1.00	44	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	104-51-8	n-Butylbenzene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	156-60-5	trans-1,2-Dichloroethylene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	156-59-2	cis-1,2-Dichloroethylene	SOIL	LA-523-455	U	< 2.20	ug/kg	1.00	2.2	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	TPHDIESEL	Total Pet. Hydrocarbons Diesel	SOIL	NWTPH	U	< 4.10e+03	ug/kg	1.00	4.1e+03	01/03/05 12/20/04	12/20/04
W040002744	B19945	TRENT	TPHKEROSENE	Kerosene	SOIL	NWTPH	U	< 4.10e+03	ug/kg	1.00	4.1e+03	01/03/05 12/20/04	12/20/04

MDL=Minimum Detection Limit

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DF=Dilution Factor

* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

Report WGPP/ver. 1.1

Groundwater Remediation Program

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: PCBs complete list

SAF Number: F04-015
 Sample Date: 12/15/04
 Receive Date: 12/15/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002627

BATCH QC ASSOCIATED WITH SAMPLE

MS	Aroclor-1254	11097-69-1	1095.5	107.000	% Recov	01/04/05	75.000	125.000	
MS	Decachlorobiphenyl	2051-24-3	954.53	92.800	% Recov	01/04/05	50.000	150.000	
MS	Tetrachloro-m-xylene	877-09-8	907.04	88.200	% Recov	01/04/05	50.000	150.000	
MSD	Aroclor-1254	11097-69-1	1128.7	110.000	% Recov	01/04/05	75.000	125.000	
MSD	Decachlorobiphenyl	2051-24-3	972.16	94.800	% Recov	01/04/05	50.000	150.000	
MSD	Tetrachloro-m-xylene	877-09-8	938.42	91.500	% Recov	01/04/05	50.000	150.000	
SPK-RPD	Aroclor-1254	11097-69-1	110.000	2.765	RPD	01/04/05	0.000	25.000	
SPK-RPD	Decachlorobiphenyl	2051-24-3	94.800	2.132	RPD	01/04/05	0.000	20.000	
SPK-RPD	Tetrachloro-m-xylene	877-09-8	91.500	3.673	RPD	01/04/05	0.000	20.000	

Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

SURR	Decachlorobiphenyl	2051-24-3	1022.7	93.500	% Recov	01/04/05	50.000	150.000	
SURR	Tetrachloro-m-xylene	877-09-8	1004.0	91.800	% Recov	01/04/05	50.000	150.000	

BATCH QC

BLANK	Aroclor-1016	12674-11-2	< 50	n/a	UGKG	01/04/05		U	
BLANK	Aroclor-1221	11104-28-2	< 100	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1232	11141-16-5	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1242	53469-21-9	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1248	12672-29-6	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1254	11097-69-1	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1260	11096-82-5	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1262	37324-23-5	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Aroclor-1268	11100-14-4	< 50	n/a	ug/Kg	01/04/05		U	
BLANK	Decachlorobiphenyl	2051-24-3	893.08	89.300	% Recov	01/04/05	50.000	150.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: PCBs complete list

SAF Number: F04-015
 Sample Date:
 Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Tetrachloro-m-xylene	877-09-8	921.65	92.200	% Recov	01/04/05	50.000	150.000	
LCS	Aroclor-1254	11097-69-1	1080.1	108.000	% Recov	01/04/05	70.000	130.000	
LCS	Decachlorobiphenyl	2051-24-3	963.29	96.300	% Recov	01/04/05	50.000	150.000	
LCS	Tetrachloro-m-xylene	877-09-8	922.57	92.300	% Recov	01/04/05	50.000	150.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: SW-846 8270B Semi-Vols

SAF Number: F04-015
 Sample Date: 12/15/04
 Receive Date: 12/15/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W040002628									
BATCH QC ASSOCIATED WITH SAMPLE									
MS	1,2,4-Trichlorobenzene	120-82-1	3272.7	87.900	% Recov	01/05/05	46.000	107.000	
MS	1,4-Dichlorobenzene	106-46-7	3068.4	82.400	% Recov	01/05/05	30.000	96.000	
MS	2,4-Dinitrotoluene	121-14-2	3097.8	83.200	% Recov	01/05/05	59.000	106.000	
MS	2-Fluorophenol	367-12-4	3355.8	90.100	% Recov	01/05/05	42.000	105.000	
MS	Acenaphthene	83-32-9	3632.0	97.600	% Recov	01/05/05	61.000	116.000	
MS	4-Chloro-3-methylphenol	59-50-7	5162.5	92.500	% Recov	01/05/05	61.000	106.000	
MS	2-Chlorophenol	95-57-8	4724.7	84.600	% Recov	01/05/05	66.000	106.000	
MS	N-Nitrosodi-n-dipropylamine	621-64-7	3631.4	97.500	% Recov	01/05/05	71.000	114.000	
MS	2-Fluorobiphenyl	321-60-8	3589.3	96.400	% Recov	01/05/05	56.000	122.000	
MS	Phenol	108-95-2	5558.4	99.500	% Recov	01/05/05	42.000	111.000	
MS	Nitrobenzene-d5	4165-80-0	3270.7	87.900	% Recov	01/05/05	64.000	111.000	
MS	4-Nitrophenol	100-02-7	5313.1	95.100	% Recov	01/05/05	32.000	118.000	
MS	Pentachlorophenol	87-86-5	4712.8	84.400	% Recov	01/05/05	62.000	114.000	
MS	Phenol-d5	4165-62-2	3695.8	99.300	% Recov	01/05/05	54.000	120.000	
MS	Pyrene	129-00-0	3138.7	84.300	% Recov	01/05/05	66.000	118.000	
MS	2,4,6-Tribromophenol	118-79-6	3485.7	93.600	% Recov	01/05/05	24.000	122.000	
MS	Terphenyl-d14 (7Cl)	98904-43-9	3151.9	84.700	% Recov	01/05/05	35.000	150.000	
MSD	1,2,4-Trichlorobenzene	120-82-1	3260.1	87.600	% Recov	01/05/05	46.000	107.000	
MSD	1,4-Dichlorobenzene	106-46-7	3117.0	83.800	% Recov	01/05/05	30.000	96.000	
MSD	2,4-Dinitrotoluene	121-14-2	3135.0	84.300	% Recov	01/05/05	59.000	106.000	
MSD	2-Fluorophenol	367-12-4	3424.3	92.000	% Recov	01/05/05	42.000	105.000	
MSD	Acenaphthene	83-32-9	3641.4	97.900	% Recov	01/05/05	61.000	116.000	
MSD	4-Chloro-3-methylphenol	59-50-7	5154.0	92.300	% Recov	01/05/05	61.000	106.000	
MSD	2-Chlorophenol	95-57-8	4811.4	86.200	% Recov	01/05/05	66.000	106.000	
MSD	N-Nitrosodi-n-dipropylamine	621-64-7	3599.8	96.700	% Recov	01/05/05	71.000	114.000	
MSD	2-Fluorobiphenyl	321-60-8	3531.1	94.900	% Recov	01/05/05	56.000	122.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: SW-846 8270B Semi-Vols

SAF Number: F04-015
 Sample Date: 12/15/04
 Receive Date: 12/15/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
MSD	Phenol	108-95-2	5613.4	101.000	% Recov	01/05/05	42.000	111.000	
MSD	Nitrobenzene-d5	4165-60-0	3300.8	88.700	% Recov	01/05/05	64.000	111.000	
MSD	4-Nitrophenol	100-02-7	5087.6	91.200	% Recov	01/05/05	32.000	118.000	
MSD	Pentachlorophenol	87-86-5	5274.6	94.500	% Recov	01/05/05	62.000	114.000	
MSD	Phenol-d5	4165-62-2	3847.4	103.000	% Recov	01/05/05	54.000	120.000	
MSD	Pyrene	129-00-0	3096.6	83.200	% Recov	01/05/05	66.000	118.000	
MSD	2,4,6-Tribromophenol	118-79-6	3522.4	94.700	% Recov	01/05/05	24.000	122.000	
MSD	Terphenyl-d14 (7Cl)	98904-43-9	3150.6	84.700	% Recov	01/05/05	35.000	150.000	
SPK-RPD	1,2,4-Trichlorobenzene	120-82-1	87.600	0.342	RPD	01/05/05	0.000	20.000	
SPK-RPD	1,4-Dichlorobenzene	106-46-7	83.800	1.685	RPD	01/05/05	0.000	20.000	
SPK-RPD	2,4-Dinitrotoluene	121-14-2	84.300	1.313	RPD	01/05/05	0.000	20.000	
SPK-RPD	2-Fluorophenol	367-12-4	92.000	2.087	RPD	01/05/05	0.000	20.000	
SPK-RPD	Acenaphthene	83-32-9	97.900	0.307	RPD	01/05/05	0.000	20.000	
SPK-RPD	4-Chloro-3-methylphenol	59-50-7	92.300	0.216	RPD	01/05/05	0.000	20.000	
SPK-RPD	2-Chlorophenol	95-57-8	86.200	1.874	RPD	01/05/05	0.000	20.000	
SPK-RPD	N-Nitrosodi-n-dipropylamine	621-64-7	96.700	0.824	RPD	01/05/05	0.000	20.000	
SPK-RPD	2-Fluorobiphenyl	321-60-8	94.900	1.568	RPD	01/05/05	0.000	20.000	
SPK-RPD	Phenol	108-95-2	101.000	1.496	RPD	01/05/05	0.000	20.000	
SPK-RPD	Nitrobenzene-d5	4165-60-0	88.700	0.906	RPD	01/05/05	0.000	20.000	
SPK-RPD	4-Nitrophenol	100-02-7	91.200	4.187	RPD	01/05/05	0.000	20.000	
SPK-RPD	Pentachlorophenol	87-86-5	94.500	11.291	RPD	01/05/05	0.000	20.000	
SPK-RPD	Phenol-d5	4165-62-2	103.000	3.658	RPD	01/05/05	0.000	20.000	
SPK-RPD	Pyrene	129-00-0	83.200	1.313	RPD	01/05/05	0.000	20.000	
SPK-RPD	2,4,6-Tribromophenol	118-79-6	94.700	1.168	RPD	01/05/05	0.000	20.000	
SPK-RPD	Terphenyl-d14 (7Cl)	98904-43-9	84.700	0.000	RPD	01/05/05	0.000	20.000	

Lab ID: W040002744
 BATCH QC ASSOCIATED WITH SAMPLE

SURR	2-Fluorophenol	367-12-4	2770.3	75.600	% Recov	01/05/05	42.000	105.000
SURR	2-Fluorobiphenyl	321-60-8	3551.6	97.000	% Recov	01/05/05	56.000	122.000

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: SW-846 8270B Semi-Vols

SAF Number: F04-015
 Sample Date: 12/20/04
 Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
SURR	Nitrobenzene-d5	4165-60-0	3120.1	85.200	% Recov	01/05/05	64.000	111.000	
SURR	Phenol-d5	4165-62-2	3235.2	88.300	% Recov	01/05/05	54.000	120.000	
SURR	2,4,6-Tribromophenol	118-79-6	2654.8	72.500	% Recov	01/05/05	24.000	122.000	
SURR	Terphenyl-d14 (7Cl)	98904-43-9	3138.4	85.700	% Recov	01/05/05	35.000	150.000	
BATCH QC									
BLANK	1,2,4-Trichlorobenzene	120-82-1	< 290	n/a	ug/Kg	01/05/05			U
BLANK	1,4-Dichlorobenzene	106-46-7	< 310	n/a	ug/Kg	01/05/05			U
BLANK	2,4-Dinitrotoluene	121-14-2	< 67	n/a	ug/Kg	01/05/05			U
BLANK	2-Fluorophenol	367-12-4	2836.8	85.100	% Recov	01/05/05	42.000	105.000	
BLANK	Acenaphthene	83-32-9	< 67	n/a	ug/Kg	01/05/05			U
BLANK	4-Chloro-3-methylphenol	59-50-7	< 67	n/a	ug/Kg	01/05/05			U
BLANK	2-Chlorophenol	95-57-8	< 150	n/a	ug/Kg	01/05/05			U
BLANK	N-Nitrosodi-n-dipropylamine	621-64-7	< 67	n/a	ug/Kg	01/05/05			U
BLANK	2-Fluorobiphenyl	321-60-8	3389.2	102.000	% Recov	01/05/05	56.000	122.000	
BLANK	Phenol	108-95-2	< 100	n/a	ug/Kg	01/05/05			U
BLANK	Nitrobenzene-d5	4165-60-0	2947.9	88.400	% Recov	01/05/05	64.000	111.000	
BLANK	4-Nitrophenol	100-02-7	< 650	n/a	ug/Kg	01/05/05			U
BLANK	Pentachlorophenol	87-86-5	< 300	n/a	ug/Kg	01/05/05			U
BLANK	Phenol-d5	4165-62-2	3225.7	96.800	% Recov	01/05/05	54.000	120.000	
BLANK	Pyrene	129-00-0	< 67	n/a	ug/Kg	01/05/05			U
BLANK	Tributyl phosphate	126-73-8	< 67	n/a	ug/Kg	01/05/05			U
BLANK	2,4,6-Tribromophenol	118-79-6	2612.2	78.400	% Recov	01/05/05	24.000	122.000	
BLANK	Terphenyl-d14 (7Cl)	98904-43-9	3111.0	93.300	% Recov	01/05/05	35.000	150.000	
LCS	1,2,4-Trichlorobenzene	120-82-1	2929.4	87.900	% Recov	01/05/05	46.000	107.000	
LCS	1,4-Dichlorobenzene	106-46-7	2720.8	81.600	% Recov	01/05/05	42.000	111.000	
LCS	2,4-Dinitrotoluene	121-14-2	2823.4	84.700	% Recov	01/05/05	59.000	106.000	
LCS	2-Fluorophenol	367-12-4	3086.1	92.600	% Recov	01/05/05	50.000	110.000	
LCS	Acenaphthene	83-32-9	3251.4	97.500	% Recov	01/05/05	61.000	116.000	
LCS	4-Chloro-3-methylphenol	59-50-7	4796.8	95.900	% Recov	01/05/05	61.000	106.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: SW-846 8270B Semi-Vols

SAF Number: F04-015
 Sample Date:
 Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
LCS	2-Chlorophenol	95-57-8	4202.4	84.000	% Recov	01/05/05	66.000	106.000	
LCS	N-Nitrosodi-n-dipropylamine	621-64-7	3066.1	92.000	% Recov	01/05/05	71.000	114.000	
LCS	2-Fluorobiphenyl	321-60-8	3087.5	92.600	% Recov	01/05/05	58.000	109.000	
LCS	Phenol	108-95-2	4718.0	94.400	% Recov	01/05/05	67.000	105.000	
LCS	Nitrobenzene-d5	4165-60-0	2789.5	83.700	% Recov	01/05/05	60.000	118.000	
LCS	4-Nitrophenol	100-02-7	4781.5	95.600	% Recov	01/05/05	32.000	118.000	
LCS	Pentachlorophenol	87-86-5	5007.2	100.000	% Recov	01/05/05	62.000	114.000	
LCS	Phenol-d5	4165-62-2	2902.5	87.100	% Recov	01/05/05	59.000	116.000	
LCS	Pyrene	129-00-0	2683.1	80.500	% Recov	01/05/05	66.000	118.000	
LCS	2,4,6-Tribromophenol	118-79-6	3120.4	93.600	% Recov	01/05/05	60.000	120.000	
LCS	Terphenyl-d14 (7Cl)	98904-43-9	2972.2	89.200	% Recov	01/05/05	60.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: WTPH-D TPH Diesel Range (Wa)

SAF Number: F04-015

Sample Date: 12/15/04

Receive Date: 12/15/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002627

BATCH QC ASSOCIATED WITH SAMPLE

MS	ortho-Terphenyl	Surr	84-15-1	25403	98.100	% Recov	01/04/05	70.000	130.000
MS	Total Pet. Hydrocarbons Diesel		TPHDIESEL	131300	101.000	% Recov	01/04/05	75.000	125.000
MSD	ortho-Terphenyl	Surr	84-15-1	26324	102.000	% Recov	01/03/05	70.000	130.000
MSD	Total Pet. Hydrocarbons Diesel		TPHDIESEL	130940	101.000	% Recov	01/03/05	75.000	125.000
SPK-RPD	ortho-Terphenyl	Surr	84-15-1	102.000	3.898	RPD	01/03/05	0.000	20.000
SPK-RPD	Total Pet. Hydrocarbons Diesel		TPHDIESEL	101.000	0.000	RPD	01/03/05	0.000	20.000

Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

SURR	ortho-Terphenyl	Surr	84-15-1	25342	92.400	% Recov	01/03/05	70.000	130.000
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BATCH QC

BLANK	Kerosene		TPHKEROSENE	< 3800	n/a	ug/Kg	01/03/05		U
BLANK	ortho-Terphenyl	Surr	84-15-1	19254	77.000	% Recov	01/03/05	70.000	130.000
BLANK	Total Pet. Hydrocarbons Diesel		TPHDIESEL	< 3800	n/a	ug/Kg	01/03/05		U
LCS	Kerosene		TPHKEROSENE	116200	93.000	% Recov	01/04/05	70.000	130.000
LCS	ortho-Terphenyl	Surr	84-15-1	21428	85.700	% Recov	01/04/05	70.000	130.000

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: NWTPH-GX TPH Gasoline Range

SAF Number: F04-015

Sample Date: 12/20/04

Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

DUP	Total Pet. Hydrocarbons Gas	TPHGASOLINE	<250	n/a	RPD	01/03/05	0.000	20.000	U
MS	Total Pet. Hydrocarbons Gas	TPHGASOLINE	1300	92.857	% Recov	01/03/05	50.000	150.000	
MSD	Total Pet. Hydrocarbons Gas	TPHGASOLINE	1200	85.714	% Recov	01/03/05	50.000	150.000	
SPK-RPD	Total Pet. Hydrocarbons Gas	TPHGASOLINE	85.714	8.000	RPD	01/03/05	0.000	20.000	

BATCH QC

BLANK	Total Pet. Hydrocarbons Gas	TPHGASOLINE	<250	n/a	mg/L	01/03/05	0.000	300.000	U
LCS	Total Pet. Hydrocarbons Gas	TPHGASOLINE	1127	88.323	% Recov	01/03/05	85.000	115.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: VOA Ground Water Protection

SAF Number: F04-015

Sample Date: 12/20/04

Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

MS	1,1-Dichloroethene	75-35-4	54.990	100.000	% Recov	01/03/05	63.000	117.000	
MS	Benzene	71-43-2	55.640	101.000	% Recov	01/03/05	75.000	129.000	
MS	4-Bromofluorobenzene	460-00-4	121.00	110.000	% Recov	01/03/05	84.000	116.000	
MS	Chlorobenzene	108-90-7	59.260	108.000	% Recov	01/03/05	79.000	119.000	
MS	1,2-Dichloroethane-d4	17060-07-0	118.40	108.000	% Recov	01/03/05	82.000	136.000	
MS	Toluene-d8	2037-26-5	116.10	106.000	% Recov	01/03/05	89.000	119.000	
MS	Toluene	108-88-3	55.570	101.000	% Recov	01/03/05	76.000	120.000	
MS	Trichloroethene	79-01-6	56.540	103.000	% Recov	01/03/05	73.000	123.000	
MSD	1,1-Dichloroethene	75-35-4	56.030	102.000	% Recov	01/03/05	63.000	117.000	
MSD	Benzene	71-43-2	61.560	112.000	% Recov	01/03/05	75.000	129.000	
MSD	4-Bromofluorobenzene	460-00-4	118.90	108.000	% Recov	01/03/05	84.000	116.000	
MSD	Chlorobenzene	108-90-7	61.250	111.000	% Recov	01/03/05	79.000	119.000	
MSD	1,2-Dichloroethane-d4	17060-07-0	116.70	106.000	% Recov	01/03/05	82.000	136.000	
MSD	Toluene-d8	2037-26-5	117.90	107.000	% Recov	01/03/05	89.000	119.000	
MSD	Toluene	108-88-3	58.540	106.000	% Recov	01/03/05	76.000	120.000	
MSD	Trichloroethene	79-01-6	59.730	109.000	% Recov	01/03/05	73.000	123.000	
SPK-RPD	1,1-Dichloroethene	75-35-4	102.000	1.980	RPD	01/03/05	0.000	25.000	
SPK-RPD	Benzene	71-43-2	112.000	10.329	RPD	01/03/05	0.000	25.000	
SPK-RPD	4-Bromofluorobenzene	460-00-4	108.000	1.835	RPD	01/03/05	0.000	25.000	
SPK-RPD	Chlorobenzene	108-90-7	111.000	2.740	RPD	01/03/05	0.000	25.000	
SPK-RPD	1,2-Dichloroethane-d4	17060-07-0	106.000	1.869	RPD	01/03/05	0.000	25.000	
SPK-RPD	Toluene-d8	2037-26-5	107.000	0.939	RPD	01/03/05	0.000	25.000	
SPK-RPD	Toluene	108-88-3	106.000	4.831	RPD	01/03/05	0.000	25.000	
SPK-RPD	Trichloroethene	79-01-6	109.000	5.660	RPD	01/03/05	0.000	25.000	
SURR	4-Bromofluorobenzene	460-00-4	121.90	111.000	% Recov	01/03/05	71.000	125.000	
SURR	1,2-Dichloroethane-d4	17060-07-0	119.20	108.000	% Recov	01/03/05	80.000	134.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: VOA Ground Water Protection

SAF Number: F04-015

Sample Date: 12/20/04

Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
SURR	Toluene-d8	2037-26-5	114.90	104.000	% Recov	01/03/05	80.000	126.000	

BATCH QC

BLANK	1,1-Dichloroethane	75-34-3	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,1,1-Trichloroethane	71-55-6	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,1,2-Trichloroethane	79-00-5	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,1,2,2-Tetrachloroethane	79-34-5	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,1-Dichloroethene	75-35-4	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,2-Dichloroethane	107-06-2	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,2-Dichloroethene(Total)	540-59-0	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1-Butanol	71-36-3	< 40	n/a	ug/Kg	01/03/05			U
BLANK	2-Hexanone	591-78-6	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	4-Methyl-2-Pentanone	108-10-1	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Acetone	67-64-1	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Bromodichloromethane	75-27-4	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Benzene	71-43-2	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	4-Bromofluorobenzene	460-00-4	112.90	113.000	% Recov	01/03/05	71.000	125.000	
BLANK	Bromoform	75-25-2	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	n-Butylbenzene	104-51-8	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Carbon disulfide	75-15-0	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Carbon tetrachloride	56-23-5	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Dibromochloromethane	124-48-1	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Chloroform	67-66-3	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Chlorobenzene	108-90-7	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	cis-1,2-Dichloroethylene	156-59-2	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	cis-1,3-Dichloropropene	10061-01-5	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Chloroethane	75-00-3	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,2-Dichloroethane-d4	17060-07-0	111.30	111.000	% Recov	01/03/05	80.000	134.000	
BLANK	trans-1,2-Dichloroethylene	156-60-5	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	1,2-Dichloropropane	78-87-5	< 2.0	n/a	ug/Kg	01/03/05			U

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: VOA Ground Water Protection

SAF Number: F04-015

Sample Date:

Receive Date:

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
BLANK	Ethylbenzene	100-41-4	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Bromomethane	74-83-9	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Chloromethane	74-87-3	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	2-Butanone	78-93-3	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Methylenechloride	75-09-2	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Tetrachloroethene	127-18-4	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Styrene	100-42-5	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Xylenes (total)	1330-20-7	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Toluene-d8	2037-26-5	106.10	106.000	% Recov	01/03/05	80.000	126.000	
BLANK	Toluene	108-88-3	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	trans-1,3-Dichloropropene	10061-02-6	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Trichloroethene	79-01-6	< 2.0	n/a	ug/Kg	01/03/05			U
BLANK	Vinyl chloride	75-01-4	< 2.0	n/a	ug/Kg	01/03/05			U
LCS	1,1-Dichloroethene	75-35-4	50.310	101.000	% Recov	01/03/05	70.000	130.000	
LCS	Benzene	71-43-2	54.320	109.000	% Recov	01/03/05	70.000	130.000	
LCS	4-Bromo fluorobenzene	460-00-4	112.70	113.000	% Recov	01/03/05	71.000	125.000	
LCS	Chlorobenzene	108-90-7	55.740	111.000	% Recov	01/03/05	70.000	130.000	
LCS	1,2-Dichloroethane-d4	17060-07-0	117.60	118.000	% Recov	01/03/05	80.000	134.000	
LCS	Toluene-d8	2037-26-5	107.40	107.000	% Recov	01/03/05	80.000	126.000	
LCS	Toluene	108-88-3	56.340	113.000	% Recov	01/03/05	70.000	130.000	
LCS	Trichloroethene	79-01-6	54.570	109.000	% Recov	01/03/05	70.000	130.000	

WSCF

ANALYTICAL RESULTS REPORT

Attention: Steve Trent **Group #:** WSCF20042473
Project: F04-015: F04-015

Sample #	Client ID	CAS #	Test Performed	Matrix	WSCF Method	RQ	Result	Unit	DF	MDL	Analyze Sample	Receive
Radiochemistry												
W040002744	B19945	TRENT	14596-10-2	Americium-241	SOIL	LA-508-471	U	0.0200	pCi/g	1.00	0.032	01/11/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Am-241 by AEA Total Cntg Error	SOIL	LA-508-471	+-	0.020	pCi/g	1.00	0.0	01/11/05 12/20/04 12/20/04
W040002744	B19945	TRENT	10198-40-0	Cobalt-60	SOIL	LA-508-481	U	-5.84e-03	pCi/g	1.00	0.011	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Co-60 Rel. Count Error (GEA)	SOIL	LA-508-481	+-	6.9e-03	pCi/g	1.00	0.0	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	10045-97-3	Cesium-137	SOIL	LA-508-481	U	-3.75e-05	pCi/g	1.00	0.012	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Cs-137 Rel. Count Error (GEA)	SOIL	LA-508-481	+-	3.8e-04	pCi/g	1.00	0.0	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	14683-23-9	Europium-152	SOIL	LA-508-481	U	-8.25e-03	pCi/g	1.00	0.035	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Eu-152 Rel. Count Error (GEA)	SOIL	LA-508-481	+-	0.024	pCi/g	1.00	0.0	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	15585-10-1	Europium-154	SOIL	LA-508-481	U	-0.0291	pCi/g	1.00	0.038	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Eu-154 Rel. Count Error (GEA)	SOIL	LA-508-481	+-	0.029	pCi/g	1.00	0.0	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	14391-16-3	Europium-155	SOIL	LA-508-481		0.0524	pCi/g	1.00	0.052	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Eu-155 Rel. Count Error (GEA)	SOIL	LA-508-481	+-	0.045	pCi/g	1.00	0.0	01/03/05 12/20/04 12/20/04
W040002744	B19945	TRENT	13981-16-3	Plutonium-238	SOIL	LA-508-471	U	-0.0130	pCi/g	1.00	0.056	01/11/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Pu-238 by AEA Total Cntg Error	SOIL	LA-508-471	+-	0.031	pCi/g	1.00	0.0	01/11/05 12/20/04 12/20/04
W040002744	B19945	TRENT	PU-239/240	Pu-239/240 by AEA	SOIL	LA-508-471	U	5.40e-03	pCi/g	1.00	0.017	01/11/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Pu-239/240 AEA Total Cntg Err	SOIL	LA-508-471	+-	9.7e-03	pCi/g	1.00	0.0	01/11/05 12/20/04 12/20/04
W040002744	B19945	TRENT	10098-97-2	Strontium-89/90	SOIL	LA-508-415	U	-0.0550	pCi/g	1.00	0.22	01/13/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	Sr-89/90 Rel. Count Error	SOIL	LA-508-415	+-	0.34	pCi/g	1.00	0.0	01/13/05 12/20/04 12/20/04
W040002744	B19945	TRENT	U-233/234	Uranium-233/234	SOIL	LA-508-471		0.280	pCi/g	1.00	0.021	01/17/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	U-233/234 AEA Total Cntg Error	SOIL	LA-508-471	+-	0.087	pCi/g	1.00	0.0	01/17/05 12/20/04 12/20/04
W040002744	B19945	TRENT	15117-96-1	Uranium-235	SOIL	LA-508-471		0.0200	pCi/g	1.00	6.7e-03	01/17/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	U-235 by AEA Total Cntg Error	SOIL	LA-508-471	+-	0.015	pCi/g	1.00	0.0	01/17/05 12/20/04 12/20/04
W040002744	B19945	TRENT	U-238	Uranium-238	SOIL	LA-508-471		0.270	pCi/g	1.00	0.024	01/17/05 12/20/04 12/20/04
W040002744	B19945	TRENT	E,T,C	U-238 by AEA Total Cntg Error	SOIL	LA-508-471	+-	0.086	pCi/g	1.00	0.10	01/17/05 12/20/04 12/20/04

MDL=Minimum Detection Limit

B - The analyte < the RDL but > = the IDL/MDL (inorganic)

U - Analyzed for but not detected above limiting criteria.

RQ=Result Qualifier

DF=Dilution Factor

* - Indicates results that have NOT been validated; + - Indicates more than six qualifier symbols

Report WGPP/ver. 1.1

Groundwater Remediation Program

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: Americium by AEA

SAF Number: F04-015
 Sample Date: 12/20/04
 Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W040002744									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Americium-241	14596-10-2	6.2e-02	n/a	RPD	01/11/05	0.000	20.000	
BATCH QC									
BLANK	Americium-241	14596-10-2	U2.1e-02	n/a	pCi/g	01/11/05	-10.000	1000.000	
LCS	Americium-241	14596-10-2	4.6e+01	95.634	% Recov	01/11/05	75.000	125.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473

Matrix: SOLID

Test: Gamma Energy Analysis-grd H₂O

SAF Number: F04-015

Sample Date: 12/20/04

Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

DUP	Cobalt-60	10198-40-0	U-3.70e-3	n/a	RPD	01/03/05	0.000	20.000	
DUP	Cesium-137	10045-97-3	U1.49e-03	n/a	RPD	01/03/05	0.000	20.000	
DUP	Europium-152	14683-23-9	U2.36e-03	n/a	RPD	01/03/05	0.000	20.000	
DUP	Europium-154	15585-10-1	U-2.44e-2	n/a	RPD	01/03/05	0.000	20.000	
DUP	Europium-155	14391-16-3	5.18e-02	1.152	RPD	01/03/05	0.000	20.000	

BATCH QC

BLANK	Cobalt-60	10198-40-0	U2.98e-3	n/a	pCi/g	01/04/05	-10.000	1000.000	
BLANK	Cesium-137	10045-97-3	U-1.3e-3	n/a	pCi/g	01/04/05	-10.000	1000.000	
BLANK	Europium-152	14683-23-9	U-2.0e-2	n/a	pCi/g	01/04/05	-10.000	1000.000	
BLANK	Europium-154	15585-10-1	U3.55e-3	n/a	pCi/g	01/04/05	-10.000	1000.000	
BLANK	Europium-155	14391-16-3	U-3.9e-3	n/a	pCi/g	01/04/05	-10.000	1000.000	
LCS	Cesium-137	10045-97-3	3.87e+03	108.101	% Recov	01/03/05	80.000	120.000	

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: Plutonium Isotopes by AEA

SAF Number: F04-015
 Sample Date: 12/20/04
 Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

DUP	Pu-239/240 by AEA	PU-239/240	U5.6e-03	n/a	RPD	01/11/05	0.000	20.000
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BATCH QC

BLANK	Pu-239/240 by AEA	PU-239/240	2.4e-02	0.024	pCi/g	01/11/05	-10.000	1000.000
LCS	Pu-239/240 by AEA	PU-239/240	4.9e+01	99.593	% Recov	01/11/05	75.000	125.000

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: Strontium 89/90

SAF Number: F04-015
 Sample Date: 12/20/04
 Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
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Lab ID: W040002744

BATCH QC ASSOCIATED WITH SAMPLE

DUP	Strontium-89/90	10098-97-2	5.1E-01	n/a	RPD	01/13/05	0.000	20.000
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BATCH QC

BLANK	Strontium-89/90	10098-97-2	-2.0e-01	-0.200	pCi/g	01/13/05	-10.000	300.000
LCS	Strontium-89/90	10098-97-2	63.3	89.030	% Recov	01/13/05	80.000	120.000

WSCF ANALYTICAL LABORATORY QC REPORT

SDG Number: WSCF20042473
 Matrix: SOLID
 Test: Uranium Isotopes by AEA

SAF Number: F04-015
 Sample Date: 12/20/04
 Receive Date: 12/20/04

QC Type	Analyte	CAS #	QC Found	QC Yield	Units	Analysis Date	Lower Limit	Upper Limit	RQ
Lab ID: W040002744									
BATCH QC ASSOCIATED WITH SAMPLE									
DUP	Uranium-238	U-238	2.5e-01	7.692	RPD	01/17/05	0.000	20.000	
BATCH QC									
BLANK	Uranium-238	24678-82-8	2.7e-02	0.027	pCi/g	01/17/05	-10.000	1000.000	
LCS	Uranium-238	24678-82-8	87.73	115.708	% Recov	01/17/05	75.000	125.000	

WSCF
ANALYTICAL COMMENT REPORT

Attention: Steve Trent
Project Number F04-015

Group #: WSCF20042473

Sample #	Client ID	Lab Area	Test	Comment
		VALGROUP		<p>ORGANICS: Sample concentrations are corrected for moisture and reported on a dry weight basis. gar</p> <p>ICP-MS: Preparation blank results were evaluated and have no effect on sample results. -wb</p>

Lab Areas: VALGROUP - Group Validation
LOGSAMP - Login for Sample

VALTEST - Test Validation
LOGTEST - Login for Tests

TESTDATA - Test Data Entry

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WSCF
TENTATIVELY IDENTIFIED PEAK REPORT

Attention:
Project Number

Steve Trent
F04-015 :F04-015

Group #: WSCF20042473

Sample #	Client ID	Test Name	Peak Name	CAS#	RT	RQ	Result	Units
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	TL-208 Count Error			13	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	BI-214 Count Error			13	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	RA-226 Count Error			13	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	AC-228 Count Error			13	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	RA-228 Count Error			13	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	SN-126 Count Error			18	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	BI-212 Count Error			20	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	U-235 Count Error			21	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	CS-134 Count Error			29	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	NB-94 Count Error			45	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	PB-212 Count Error			8.8	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	K-40 Count Error			9.0	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	PB-214 Count Error			9.7	%
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	CS-134			0.040	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	U-235			0.10	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	TL-208			0.30	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	BI-212			0.57	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	BI-214			0.68	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	RA-226			0.68	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	PB-214			0.72	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	AC-228			0.96	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	RA-228			0.96	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	PB-212			0.99	pCi/g
W040002744	B19945	TRENT	Gamma Energy Analysis-grd H2O	K-40			18	pCi/g
W040002744	B19945	TRENT	SW-846 8270B Semi-Vols	SMP 10.859 Diethylphthalate	84-66-2	10.85941	5.1e +02	ug/kg

RQ=Result Qualifier

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Groundwater Remediation Program

WGPE v 1.1 Report #: 20042473

Report Date: 21-jan-2005

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WSCF
TENTATIVELY IDENTIFIED PEAK REPORT

Attention: Steve Trent **Group #:** WSCF20042473
Project Number F04-015 :F04-015

Sample #	Client ID	Test Name	Peak Name	CAS#	RT	RQ	Result	Units
W040002744	B19945	TRENT	SW-846 8270B Semi-Vols	SMP 14.640 Di-n-butylphthalate	84-74-2		14.64033	3.5e +02 ug/kg

RQ=Result Qualifier

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Groundwater Remediation Program

WGPPE v 1.1 Report #: 20042473

Report Date: 21-jan-2005

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WSCF

METHOD REFERENCES REPORT

The results provided in this report were generated using the following WSCF Laboratory procedures. For your convenience, this table provides a listing of the regulatory or industry methods that are referenced by each of these WSCF procedures. Please note that the most recent version of the regulatory or industry method is listed here even though the WSCF procedure may reference an older version of the method. Also, a reference to a regulatory or industry method here does not necessarily indicate a verbatim implementation of that method.

LA-212-411	Determination of Soil pH Measurement EPA SW-846 9045C	SOIL AND WASTE pH
LA-505-412	LA-505-412: DETERMINATION OF TRACE ELEMENTS IN WATERS AND WASTES BY INDUCTIVELY EPA-600/R-94-111 200.8	DETERMINATION OF TRACE ELEMENTS IN WATERS AND WASTES BY INDUCTIVELY COUPLED PLAS
LA-508-415	LA-508-415: OPERATION OF THE PROTEAN 2-INCH ALPHA/BETA COUNTING SYSTEM FOR GROSS None	No reference to any industry method.
LA-508-471	LA-508-471: ALPHA ENERGY ANALYZER DATA ACQUISITION AND SYSTEM CHECKOUT USING ALP None	No reference to any industry method.
LA-508-481	LA-508-481: GAMMA ENERGY ANALYSIS USING PROCOUNT SOFTWARE None	No reference to any industry method.
LA-519-412	LA-519-412: TOTAL RESIDUE/% SOLIDS DRIED AT 103 - 105 C EPA-600/4-79-020 160.3 Standard Methods 2540B	RESIDUE, TOTAL Total Solids Dried at 103-105 C
LA-523-427	LA-523-427: POLYCHLORINATED BIPHENYLS (PCBs) BY GAS CHROMATOGRAPHY EPA SW-846 3510C EPA SW-846 3545 EPA SW-846 3665A EPA SW-846 8000B EPA SW-846 8082	SEPARATORY FUNNEL LIQUID-LIQUID EXTRACTION PRESSURIZED FLUID EXTRACTION (PFE) SULFURIC ACID/PERMANGANATE CLEANUP DETERMINATIVE CHROMATOGRAPHIC SEPARATIONS POLYCHLORINATED BIPHENYLS (PCBs) BY GAS CHROMATOGRAPHY

Note: A complete list of WSCF analytical procedures and referenced regulatory or industry methods is available online at
<\\ap006\aspdocs\WSCF\Sample Mgmt\ProcedureMethodCrossReference.pdf>. This document includes on-line
links to full-text versions of the procedures and methods, where available.

Report Date: 21-jan-2005

Report #: WSCF20042473

Report WGPPM/O

WSCF

METHOD REFERENCES REPORT

The results provided in this report were generated using the following WSCF Laboratory procedures. For your convenience, this table provides a listing of the regulatory or industry methods that are referenced by each of these WSCF procedures. Please note that the most recent version of the regulatory or industry method is listed here even though the WSCF procedure may reference an older version of the method. Also, a reference to a regulatory or industry method here does not necessarily indicate a verbatim implementation of that method.

LA-523-443	LA-523-443: GAS CHROMATOGRAPH ANALYSIS OF GASOLINE RANGE TOTAL PETROLEUM HYDROCARBONS WDOE TPH NWTPH-G	Volatile Petroleum Products Method for Soil and Water
LA-523-455	LA-523-455: VOLATILE SAMPLE ANALYSIS BY SW-846 EPA SW-846 8000B EPA SW-846 8260B	DETERMINATIVE CHROMATOGRAPHIC SEPARATIONS VOLATILE ORGANIC COMPOUNDS BY GAS CHROMATOGRAPHY/MASS SPECTROMETRY (GC/MS)
LA-523-456	LA-523-456: SEMIVOLATILE SAMPLE ANALYSIS BY SW-846, METHOD 8270C EPA SW-846 8000B EPA SW-846 8270C	DETERMINATIVE CHROMATOGRAPHIC SEPARATIONS SEMIVOLATILE ORGANIC COMPOUNDS BY GAS CHROMATOGRAPHY/MASS SPECTROMETRY (GC/MS)
LA-533-410	LA-533-410: ANION ANALYSIS BY ION CHROMATOGRAPHY EPA-600/R-94-111 300	DETERMINATION OF INORGANIC ANIONS BY ION CHROMATOGRAPHY
LA-695-402	LA-695-402: DETERMINATION OF CYANIDE BY MIDIDISTILLATION AND SPECTROPHOTOMETRIC EPA-600/4-79-020 335.2	Cyanide, Total
NWTPH	NWTPH-Diesel and/or Gasoline WDOE NWTPH-Dx/Gx	Total Petroleum Hydrocarbons - Diesel/Gasoline

Note: A complete list of WSCF analytical procedures and referenced regulatory or industry methods is available online at
\\ap006\aspdocs\WSCF\Sample Mgmt\ProcedureMethodCrossReference.pdf. This document includes on-line
links to full-text versions of the procedures and methods, where available.

Report Date: 21-jan-2005

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Report WGPPM/O

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W13q Worklist/Batch/QC Report for Group# WSCF20042473

WL#	S#	Batch	QC#	Tray	Type	Sample#	Test
				SAMPLE		W040002744	Percent Solids
				SAMPLE		W040002744	pH Soil and Waste Measurement
			28228	BLANK			Cyanide by Midi/Spectrophotom
			28228	BLNK-PREP			Cyanide by Midi/Spectrophotom
			28228	LCS			Cyanide by Midi/Spectrophotom
			28228	MS		W040002627	Cyanide by Midi/Spectrophotom
			28228	MSD		W040002627	Cyanide by Midi/Spectrophotom
			28228	SPK-RPD		W040002627	Cyanide by Midi/Spectrophotom
			28228	SAMPLE		W040002744	Cyanide by Midi/Spectrophotom
24578	1	24935	28262	BLANK			Gamma Energy Analysis-grd H2O
24578	2	24935	28262	LCS			Gamma Energy Analysis-grd H2O
24578	3	24935	28262	DUP		W040002744	Gamma Energy Analysis-grd H2O
24578	4	24935	28262	SAMPLE		W040002744	Gamma Energy Analysis-grd H2O
			28264	BLANK			WTPH-D TPH Diesel Range (Wa)
			28264	LCS			WTPH-D TPH Diesel Range (Wa)
			28264	MS		W040002627	WTPH-D TPH Diesel Range (Wa)
			28264	MSD		W040002627	WTPH-D TPH Diesel Range (Wa)
			28264	SPK-RPD		W040002627	WTPH-D TPH Diesel Range (Wa)
			28264	SAMPLE		W040002744	WTPH-D TPH Diesel Range (Wa)
			28264	SURR		W040002744	WTPH-D TPH Diesel Range (Wa)
			28289	BLANK			PCBs complete list
			28289	LCS			PCBs complete list
			28289	MS		W040002627	PCBs complete list
			28289	MSD		W040002627	PCBs complete list
			28289	SPK-RPD		W040002627	PCBs complete list
			28289	SAMPLE		W040002744	PCBs complete list
			28289	SURR		W040002744	PCBs complete list
24624	2	24980	28311	BLANK			Anions by Ion Chromatography
24624	13	24980	28311	BLANK			Anions by Ion Chromatography
24624	17	24980	28311	BLANK			Anions by Ion Chromatography
24624	3	24980	28311	LCS			Anions by Ion Chromatography
24624	12	24980	28311	LCS			Anions by Ion Chromatography
24624	5	24980	28311	DUP		W040002744	Anions by Ion Chromatography
24624	6	24980	28311	MS		W040002744	Anions by Ion Chromatography
24624	7	24980	28311	MSD		W040002744	Anions by Ion Chromatography
24624	4	24980	28311	SAMPLE		W040002744	Anions by Ion Chromatography
			28319	BLANK			SW-846 8270B Semi-Vols
			28319	LCS			SW-846 8270B Semi-Vols
			28319	MS		W040002628	SW-846 8270B Semi-Vols
			28319	MSD		W040002628	SW-846 8270B Semi-Vols
			28319	SPK-RPD		W040002628	SW-846 8270B Semi-Vols
			28319	SAMPLE		W040002744	SW-846 8270B Semi-Vols
			28319	SURR		W040002744	SW-846 8270B Semi-Vols
24674	1	25032	28392	BLANK			Americium by AEA
24674	2	25032	28392	LCS			Americium by AEA
24674	3	25032	28392	DUP		W040002744	Americium by AEA
24674	4	25032	28392	SAMPLE		W040002744	Americium by AEA

24675	1	25031	28393	BLANK		Plutonium Isotopics by AEA
24675	2	25031	28393	LCS		Plutonium Isotopics by AEA
24675	3	25031	28393	DUP	W040002744	Plutonium Isotopics by AEA
24675	4	25031	28393	SAMPLE	W040002744	Plutonium Isotopics by AEA
24620	1	24977	28416	BLANK		Strontium 89/90
24620	2	24977	28416	LCS		Strontium 89/90
24620	3	24977	28416	DUP	W040002744	Strontium 89/90
24620	4	24977	28416	SAMPLE	W040002744	Strontium 89/90
24724	1	25080	28427	BLANK		ICP-2008 MS All possible metal
24724	16	25080	28427	BLANK		ICP-2008 MS All possible metal
24724	2	25080	28427	LCS		ICP-2008 MS All possible metal
24724	17	25080	28427	LCS		ICP-2008 MS All possible metal
24724	4	25080	28427	MS	W040002732	ICP-2008 MS All possible metal
24724	5	25080	28427	MSD	W040002732	ICP-2008 MS All possible metal
24724	9	25080	28427	MS	W040002742	ICP-2008 MS All possible metal
24724	10	25080	28427	MSD	W040002742	ICP-2008 MS All possible metal
24724	0	25080	28427	SPK-RPD	W040002742	ICP-2008 MS All possible metal
24724	6	25080	28427	SAMPLE	W040002744	ICP-2008 MS All possible metal
24724	19	25080	28427	MS	W050000037	ICP-2008 MS All possible metal
24724	20	25080	28427	MSD	W050000037	ICP-2008 MS All possible metal
24724	14	25080	28427	MS	W050000048	ICP-2008 MS All possible metal
24724	15	25080	28427	MSD	W050000048	ICP-2008 MS All possible metal
24724	0	25080	28427	SPK-RPD	W050000048	ICP-2008 MS All possible metal
24709	1	25065	28436	BLANK		Uranium Isotopics by AEA
24709	2	25065	28436	LCS		Uranium Isotopics by AEA
24709	3	25065	28436	DUP	W040002744	Uranium Isotopics by AEA
24709	4	25065	28436	SAMPLE	W040002744	Uranium Isotopics by AEA
24767	1	25124	28484	BLANK		NWTPH-GX TPH Gasoline Range
24767	2	25124	28484	LCS		NWTPH-GX TPH Gasoline Range
24767	4	25124	28484	DUP	W040002744	NWTPH-GX TPH Gasoline Range
24767	5	25124	28484	MS	W040002744	NWTPH-GX TPH Gasoline Range
24767	6	25124	28484	MSD	W040002744	NWTPH-GX TPH Gasoline Range
24767	3	25124	28484	SAMPLE	W040002744	NWTPH-GX TPH Gasoline Range
24767	6	25124	28484	SPK-RPD	W040002744	NWTPH-GX TPH Gasoline Range
		28486		BLANK		VOA Ground Water Protection
		28486		LCS		VOA Ground Water Protection
		28486		MS	W040002744	VOA Ground Water Protection
		28486		MSD	W040002744	VOA Ground Water Protection
		28486		SAMPLE	W040002744	VOA Ground Water Protection
		28486		SPK-RPD	W040002744	VOA Ground Water Protection
		28486		SURR	W040002744	VOA Ground Water Protection

M8141-SLF-05-060

ATTACHMENT 3

SAMPLE RECEIPT INFORMATION

Consisting of 3 pages
Including cover page

Waste Sampling and Characterization Facility
 P.O. BOX 1970 S3-30, Richland, WA 99352
 PHONE: (509) 373-7004/FAX: (509) 373-7134

1/19/05

ACKNOWLEDGMENT OF SAMPLES RECEIVED

Feb KB

Groundwater Remediation Program

Richland, WA 99354
 Attn: Steve Trent

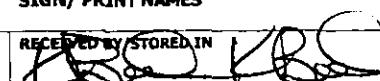
Customer Code: GPP
 PO#: 119144/ES10
 Group#: 20042473
 Project#: F04-015
 Proj Mgr: Steve Trent A0-21
 Phone: 373-5869

The following samples were received from you on 12/20/04. They have been scheduled for the tests listed beside each sample. If this information is incorrect, please contact your service representative. Thank you for using Waste Sampling and Characterization Facility.

Sample#	Sample Id	Matrix	Sample Date
		Tests Scheduled	
W040002744	B19945	TRENT	Solid, or handle as if solid 12/20/04
		@2008	@AEA-30 @AEA-31 @AEA-32 @GEA-GPP
		@IC-30	@PCBGPP @SR89_90 @SVOCGPP @TPHD-WA @TPHG
		@VOA-GPP	CN-02 PERSOLID PH-30

Test Acronym Description

Test Acronym	Description
@2008	ICP-2008 MS All possible metal
@AEA-30	Plutonium Isotopics by AEA
@AEA-31	Americium by AEA
@AEA-32	Uranium Isotopics by AEA
@GEA-GPP	Gamma Energy Analysis-grd H2O
@IC-30	Anions by Ion Chromatography
@PCBGPP	PCBs complete list
@SR89_90	Strontium 89/90
@SVOCGPP	SW-846 8270B Semi-Vols
@TPHD-WA	WTPH-D TPH Diesel Range (Wa)
@TPHG-WA	NWTPH-GX TPH Gasoline Range
@VOA-GPP	VOA Ground Water Protection
CN-02	Cyanide by Midi/Spectrophotom
PERSOLID	Percent Solids
PH-30	pH Soil and Waste Measurement

FLUOR Hanford Inc. 11/19/05		CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST						F04-015-050	PAGE 1 OF 1		
COLLECTOR Pope/Pfister/Tyra/Wiberg		COMPANY CONTACT CS Cearlock			TELEPHONE NO. 372-9638	PROJECT COORDINATOR TRENT, SJ		PRICE CODE 8N	DATA TURNAROUND 45 Days / 45 Days		
SAMPLING LOCATION 216-U-3; 127FT-129.5FT		PROJECT DESIGNATION 200-MW-1 Characterization Sampling and Analysis - Soil			SAF NO. F04-015	AIR QUALITY <input type="checkbox"/>					
ICE CHEST NO.		FIELD LOGBOOK NO. HNF-N-386 1		COA 119144ES10	METHOD OF SHIPMENT Government Vehicle						
SHIPPED TO Waste Sampling & Characterization		OFFSITE PROPERTY NO. N/A			BILL OF LADING/AIR BILL NO. N/A						
MATRIX* A=Air DL=Drum Liquids DS=Drum Solids L=Liquid O=Oil S=Soil SE=Sediment T=Tissue V=Vegetation W=Water WI=Wipe X=Other	POSSIBLE SAMPLE HAZARDS/ REMARKS N/A		PRESERVATION	Cool 4C	Cool 4C	Cool 4C	Cool 4C	Cool 4C	None		
			TYPE OF CONTAINER	aG	aG	aG	aGS*	aG	Square Bottle - Poly		
			NO. OF CONTAINER(S)	1	1	1	3	1	1		
			VOLUME	250mL	120mL	250mL	40mL	120mL	500mL		
SPECIAL HANDLING AND/OR STORAGE Radioactive Tie To: B19956 2004Z473		SAMPLE ANALYSIS		SEE ITEM (1) IN SPECIAL INSTRUCTIONS	PCBs - 8082;	SEE ITEM (2) IN SPECIAL INSTRUCTIONS	SEE ITEM (3) IN SPECIAL INSTRUCTIONS	SEE ITEM (4) IN SPECIAL INSTRUCTIONS	SEE ITEM (5) IN SPECIAL INSTRUCTIONS		
SAMPLE NO.	MATRIX*	SAMPLE DATE 12/20/04	SAMPLE TIME 0740	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>			
B19945	SOIL										
W004Z000Z744											
CHAIN OF POSSESSION				SIGN/ PRINT NAMES		SPECIAL INSTRUCTIONS					
RELINQUISHED BY/REMOVED FROM J.S. Pope 12-20-04		DATE/TIME 0835	RECEIVED BY/STORED IN 	DATE/TIME 12/20/04	** The laboratory is to report both kerosene and diesel range compounds from the WTPH-D analysis. (1)IC Anions - 300.0 {Fluoride, Nitrogen in Nitrate, Nitrogen in Nitrite, Phosphate, Sulfate}; Total Cyanide - 9010; pH (Soil) - 9045; (2)ICP/MS - 200.8 (TAL) {Cadmium, Chromium, Copper, Silver} ICP/MS - 200.8 (Add-On) {Lead, Uranium} 200.8_HG - ICPMS {Mercury} (3)VOA - 8260A (TCL); VOA - 8260A (Add-On) {1-Butanol, cis-1,2-Dichloroethylene, n-Butylbenzene, trans-1,2-Dichloroethylene} (4)Semi-VOA -- 8270A (Add-On) {Tributyl phosphate} TPH-Gasoline Range - WTPH-G; TPH-Diesel Range - WTPH-D {Total petroleum hydrocarbons - diesel range, Total petroleum hydrocarbons - kerosene range} (5)Gamma Spectroscopy {Cesium-137, Cobalt-60, Europium-152, Europium-154, Europium-155} Isotopic Plutonium; Isotopic Uranium; Americium-241; Strontium-89,90 -- Total Sr;						
RELINQUISHED BY/REMOVED FROM		DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME							
RELINQUISHED BY/REMOVED FROM		DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME							
RELINQUISHED BY/REMOVED FROM		DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME							
RELINQUISHED BY/REMOVED FROM		DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME							
RELINQUISHED BY/REMOVED FROM		DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME							
RELINQUISHED BY/REMOVED FROM		DATE/TIME	RECEIVED BY/STORED IN	DATE/TIME							
LABORATORY SECTION	RECEIVED BY		TITLE						DATE/TIME		
FINAL SAMPLE DISPOSITION	DISPOSAL METHOD		DISPOSED BY						DATE/TIME		